Successive-Cyclic *Wh*-Movement Feeds Dependent Case Competition

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Introduction Recent debate surrounding theories of ergative case has centered on two types of analyses: ergative as a dependent (configurational) case (Yip et al. 1987; Marantz 1991; Baker 2015), and ergative as an inherent case (Nash 1996; Woolford 1997). On the former, ergative case is assigned to the external argument of a transitive verb by 'competing' for case assignment with a lower nominal in the same phase. On the latter, ergative is assigned to the external argument of a transitive verb by being merged as the specifier of an agentive vP. In this paper, I present new evidence for the configurational analysis of ergative case from Koryak (Chukotko-Kamchatkan), arguing that successive-cyclic *wh*-movement causes ergative marking on the subjects of intransitive verbs. This is predicted only on the dependent case analysis.

Ergative as Dependent I will first demonstrate that ergative behaves as a dependent case in standard transitive clauses with no *wh*-movement by showing that ergative marking on the subject correlates exactly with the presence of a lower argument that does not have a lexical case. First, agentive subjects of intransitive verbs may not appear with ergative case (1a). Two-argument verbs may either have an ERG-ABS case frame, or an ABS-OBL case frame, but never an ERG-OBL. In fact, though some verbs like *peŋŋ-* 'attack' can have either a lexical (oblique) case-marked object or an ergative subject (1b), the two may not appear simultaneously (1d). Modifying a verb so that it no longer has an absolutive internal argument, such as by noun incorporation, removes ergative case from the subject, as shown by (2a) and (2b). This can feed dative shift (2c), which causes the goal to be marked with absolutive, and the subject to reappear as ergative. This evidence supports a dependent account of ergative case in Koryak rather than inherent one as the presence of ergative case on the subject is tied only to the presence of a lower argument with absolutive case.

(1) a. ʔewŋəto / *ʔewŋətonak aŋaŋjaj
Hewngyto.**ABS** / Hewngyto.**ERG** sing.2/3SG.AOR
'Hewngyto sang.'

b. kajŋən peŋŋe ʔəlvajtəŋ
bear.**ABS.SG** attack.2/3SG.AOR reindeer.**ALL**
'The bear attacked the reindeer.'

c. kajŋa peŋŋənen ʔəlveʔəl
bear.**ERG** attack.3SG.A>3.O reindeer.ABS.SG
'The bear attacked the reindeer.'

d. *kajŋa peŋŋənen ʔəlvajtəŋ
bear.**ERG** attack.3SG.A>3.O reindeer.**ALL**
'The bear attacked the reindeer.'

(2) a. ɣəmnan təc͡ʨvin uttəut akəkanaŋ
1SG.**ERG** cut.1SG.A>3SG.O tree.**ABS.SG** son.**DAT**
'I chopped down a tree for my son.'

b. ɣəmmo / *ɣəmnan tuttəc͡ʨvik akəkanaŋ
1SG.**ABS** / *1SG.**ERG** cut.tree.1SG.S son.**DAT**
'I chopped down a tree for my son.'

c. ɣəmnan tuttəc͡ʨvin akək
1SG.**ERG** cut.tree.1SG.A>3SG.O son.**ABS.SG**
'I chopped down a tree for my son.'

Movement and case *Wh*-movement of an ABS object in an embedded clause to the matrix [Spec,CP] triggers ERG on an otherwise ABS subject. As shown in (3a), the matrix subject is ERG when the ABS *wh*-word *jeju* 'what all' moves into the matrix clause, but, in (3b), the answer to in (3a), the subject is ABS: there is no other noun phrase in the matrix clause for the subject to compete for case with.

(3) a. jeju$_i$ ɣənan / *ɣəc͡ʨc͡ʨi valomnaw, əno ʔewŋətonak tulʔennin t_i
what.**ABS**.PL 2SG.**ERG** / 2SG.**ABS** hear.2SG.A>3PL.O that Hewngyto.ERG steal.3SG.A>3.O
'What all did you hear that Hewngyto stole?'

b. ɣəmmo təvaloməkˌ əno ʔewŋətonak tulʔennin kojŋo
1SG.**ABS** hear.1SG.S that Hewngyto.ERG steal.3SG.A>3.O cup.ABS.PL
'I heard that Hewngyto stole cups.'

In addition, the movement of an absolutive *wh*-word from an embedded clause to matrix [Spec,CP] triggers dative on an otherwise absolutive object, as shown by the question-answer pair in (4).

(4) a. jeju$_i$ ɣənan kunmitətvaŋŋənaw {jajɣoc͡ʨawŋəlʔəŋ / *jejɣuc͡ʨewŋəlʔu} kalik t_i
what.**ABS**.PL 2sg.**ERG** teach.2SG.A>3PL.O {student.**DAT** / student.**ABS**.PL} write.INF
'What all are you teaching the students to write?'

b. ɣəmnan təkunmitətvaŋŋənaw {jejɣuc͡ʨewŋəlʔu / *jajɣoc͡ʨawŋəlʔəŋ} kalik bukvaw
1SG.**ERG** teach.1SG.A>3PL.O {student.**ABS**.PL / student.**DAT**} write.INF letter.**ABS**.PL
'I am teaching the students to write letters.'

Finally, when the absolutive object of the complement of the verb *wiŋŋet-* 'help', which allows both an ERG-ABS and ABS-DAT case pattern on nominals in the matrix clause (5a-5b), *wh*-moves into the matrix clause, only an ERG-DAT case frame is permitted.

(5) a. ʔewŋətonak wiŋŋennin meʎʎo kalik pismon
Hewngyto.**ERG** help.3SG.A > 3.O Melljo.**ABS** write.INF letter.ABS.SG
'Hewngyto helped Melljo write the letter.'

b. ʔewŋəto wiŋŋet-i meʎʎonaŋ kalik pismon
Hewngyto.**ABS** help.2/3.S Melljo.**DAT** write.INF letter.ABS.SG
'Hewngyto helped Melljo write the letter.'

c. jənnə$_i$ ʔewŋətonak wiŋŋennin meʎʎonaŋ kalik t$_i$
what.**ABS** Hewngyto.**ERG** help.3SG.A > 3.O Melljo.**DAT** write.INF
'What did Hewngyto help Melljo write?'

Proposal I assume that ergative is a dependent case assigned to the higher of two caseless nominals within TP. I further assume that dative can have two distinct sources, which I will show correlate with their ability to be targeted for *phi*-agreement: one as an inherent case (as in (2)), which cannot be agreed with, and one as the dependent case assigned to the higher of two caseless nominals within VP, which can be. The data presented above fall out straightforwardly from these assumptions if the *wh*-word can trigger dependent case at each of its intermediate landing sites. Consider the derivation of the sentence in (3a) shown in (6). First, the wh-word triggers dependent ergative on the embedded subject, after which point it moves to the embedded [Spec,CP]. From there, it moves to the matrix [Spec,vP], at which point it is in the same phase as the matrix subject, causing the latter to receive ergative case. It subsequently moves to the matrix [Spec,CP], with no effect on case.

(6) a. [$_{\text{CP}_{wh}}$ you [$_{\text{vP}}$ hear [$_{\text{CP}}$ what that Hewngyto$_{\text{ERG}}$ [$_{\text{vP}}$ ~~what~~ stole ~~what~~]]]]
b. [$_{\text{CP}_{wh}}$ you$_{\text{ERG}}$ [$_{\text{vP}}$ what hear [$_{\text{CP}}$ ~~what~~ that Hewngyto$_{\text{ERG}}$ [$_{\text{vP}}$ ~~what~~ stole ~~what~~]]]]
c. [$_{\text{CP}_{wh}}$ what you$_{\text{ERG}}$ [$_{\text{vP}}$ ~~what~~ hear [$_{\text{CP}}$ ~~what~~ that Hewngyto$_{\text{ERG}}$ [$_{\text{vP}}$ ~~what~~ stole ~~what~~]]]]

The derivation of (4a), shown in (7), has the same steps as in (6), except that the moving *wh*-word also triggers dependent DAT on the matrix object from the embedded [Spec,CP].

(7) a. [$_{\text{CP}_{wh}}$ you [$_{\text{vP}}$ teach students [$_{\text{CP}}$ PRO [$_{\text{vP}}$ what to.write ~~what~~]]]]
b. [$_{\text{CP}_{wh}}$ you [$_{\text{vP}}$ teach students$_{\text{DAT}}$ [$_{\text{CP}}$ what PRO [$_{\text{vP}}$ ~~what~~ to.write ~~what~~]]]]
c. [$_{\text{CP}_{wh}}$ you$_{\text{ERG}}$ [$_{\text{vP}}$ what teach students$_{\text{DAT}}$ [$_{\text{CP}}$ ~~what~~ PRO [$_{\text{vP}}$ ~~what~~ to.write ~~what~~]]]]

The sentence in (5c) can be derived in two ways, corresponding to its two possible declarative counterparts. One option (corresponding to (5a)) derives it identically to (4a), where the matrix arguments start out caseless and get both of their cases assigned by the moving DP. The other option (corresponding to (5b)) has the matrix object assigned inherent DAT, and the moving *wh*-word triggering dependent case only from the matrix [Spec,vP], as schematized in (8).

(8) a. [$_{\text{CP}_{wh}}$ Hewgyto [$_{\text{vP}}$ helped Melljo$_{\text{DAT}}$ [$_{\text{CP}}$ PRO [$_{\text{vP}}$ to.write what]]]]
b. [$_{\text{CP}_{wh}}$ Hewgyto [$_{\text{vP}}$ helped Melljo$_{\text{DAT}}$ [$_{\text{CP}}$ PRO [$_{\text{vP}}$ what to.write ~~what~~]]]]
c. [$_{\text{CP}_{wh}}$ Hewgyto$_{\text{ERG}}$ [$_{\text{vP}}$ what helped Melljo$_{\text{DAT}}$ [$_{\text{CP}}$ PRO [$_{\text{vP}}$ ~~what~~ to.write ~~what~~]]]]

Conclusion I have proposed that successive cyclic *wh*-movement feeds dependent case competition in Koryak, as it causes nominals that otherwise would not (have to) have ergative or dative case to surface with it. This cannot be reconciled with an inherent case analysis, as long-distance movement should not affect the agentivity of a subject and, by extension, whether or not it gets ergative case. In addition to its implications for theories of morphological case, this result also contributes to the typology of A'-movement-triggered case assignment, already argued to exist in English (Kayne 1984), Hungarian (Coppock 2004), and Eskimo-Aleut languages (Yuan 2018).

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